OPERATION FOR UNDESCENDED TESTICLE.*

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FROM a brief scrutiny of the literature it would seem that there is thought to be a small chance of help for non-descended testicle except by castration. Erichsen [1] says, "Any attempt to bring the testicle down into the scrotum would be ineffectual." He further adds, that if it is in some position in the canal where injury is likely to occur, it is preferable to remove it. Treves [2] says the undescended testis should be stitched to the bottom of the scrotum, and under certain circumstances should be removed. Pick [3] thinks one should consider the feasibility of transplanting the gland and fixing it in the scrotum. If this cannot be done he recommends its removal. Bryant,[4] after describing a fascinating method, adds, "The successful attainment of these steps is not easy, nor finally as satisfactory as might appear from the description." Stonham [5] describes an operation where he makes a long incision and transplants the testicle, suturing the tunica albuginea to the scrotum. Kocher [6] recommends fastening the spermatic cord at its entrance into the scrotum, as well as fastening the testis to the bottom of the scrotum. Corner [7] says that replacement in the abdomen is indicated in by far the majority of cases. Bevan [8] describes an elaborate operation which necessitates opening the peritoneal cavity. Von Bramann [9] advises strongly against removal.

From the foregoing remarks it will readily be seen that there seems little to choose from in the various methods recommended. Some other writers advise massage and manipulation, and no doubt if begun early, and carried out persistently, some of the cases might be cured. Others have recommended a U-shaped truss to fit just above the testicle and force it down, while yet others have described various mechanical devices with the same object. Such methods have only to be mentioned to be condemned.

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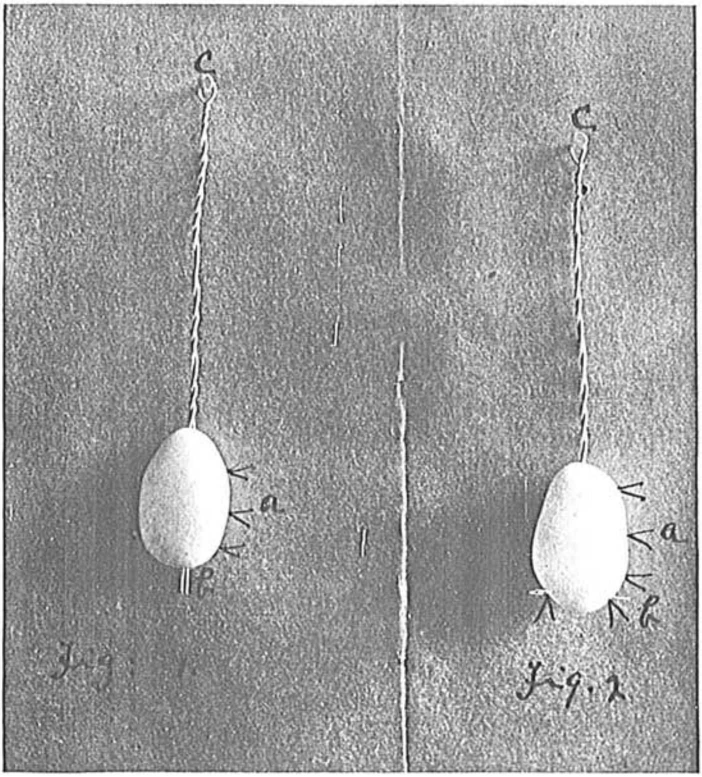
It would seem then that surgeons are divided between,—suturing to the bottom of the scrotum, transplanting within the abdomen, and removal. This latter cannot be too strongly condemned, for no matter how atrophic a testis may appear, one has no means of knowing the possibilities of development under suitable conditions.

When it comes to the question of operation, no doubt there are some cases in which, with the testis at or near the internal abdominal ring, it may be wise to transplant the gland within the abdomen, to remove it from the possibility of injury. But, when the testis is in the inguinal canal, near the external ring, or is outside the ring, the following operation which I have devised and carried out successfully, appeals to me as a reasonable means of securing a desirable result.

An incision about one inch long is made over the external abdominal ring, the testicle is secured and brought out of the wound. The finger is then carried down into the scrotum, and, by means of blunt dissection, the scrotal sac is stretched to make a suitable resting-place for the testis. The cord is then dissected free of its coverings, and if necessary to secure increased length, the cremasteric and spermatic arteries may be sacrificed, but the artery to the vas must not be interfered with. It is well now to see that the testicle can be easily replaced in the pocket provided without tension upon the cord. It is again taken out and sutured by means of chromic catgut, No. 0, through the tunica albuginea to the loops of a piece of plaited silver wire, two or three inches long, as may be required (Fig. 1 (a)). The wire ends at (b) are then pushed against the bottom of the scrotum and cut upon to permit of their being pushed through. The free ends are then bent, as in Fig. 2 (b). To make assurance doubly sure two horsehair sutures are

FIGS. 1 AND 2.



Showing testis secured to loop of silver wire to act as splint for retaining it in scrotum.

passed up through the tiny opening in the scrotum, from which the wire projects, one on each side of the wire shaft, to catch the tunica albuginea. They are brought out again and tied over the projecting wire ends (Fig. 3 (b)). The loop of the wire shaft at (c) is now sutured by means of 10-day chromic catgut No. 1 to the periosteum over the os pubis (Fig. 3 (c)). The testicle is now securely placed in the scrotum and is maintained there by means of a silver wire splint. The operation is completed by introducing through the skin, at one end of the incision, a horsehair suture which travels sub-cutaneously, taking up the spermatic fascia and divided cremasteric muscle over the cord. It is brought out again through the skin, at the opposite end, carried over the top of a small roll of gauze, and continued along as an uninterrupted stitch, to bring the skin edges into apposition. The two free ends are tied over another small roll of gauze. The wound is carefully dressed with plenty of pads and a double spica applied. On the twelfth day the dressing is removed, and the cutaneous horsehair, snipped at one end, is then easily withdrawn. The two horsehair stitches at (b) are now cut and removed, when the end of the wire is grasped with a pair of forceps and the wire splint removed.

FIG. 3.

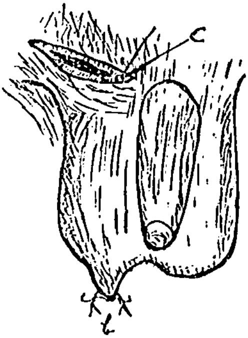


Diagram to show splint in position. (C) Catgut that secures loop of splint to periosteum over the os pubis.

The result has been most satisfactory. Both testicles are on a level, both are now of equal size, though the non-descended one was small at the time of operation. There was no pain or discomfort during healing, and I was surprised at the ease with which the wire splint came away.

This operation holds out some hope for the correction of an abnormality that heretofore has not been amenable to treatment, other than such as will lead to a greater deformity, even though it does succeed in relieving pain and discomfort.

REFERENCES.

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